


[Subscribe \(Full Service\)](#) [Register \(Limited Service, Free\)](#) [Login](#)

 Search: ☒ The ACM Digital Library ☐ The Guide

collaboration template page pointer table

SEARCH

THE ACM DIGITAL LIBRARY


[Feedback](#) [Report a problem](#) [Satisfaction survey](#)

 Terms used collaboration template page pointer table

Found 72,280 of 198,617

Sort results by

 publication date ☒

Display results

 expanded form ☒
☒ Save results to a Binder

☐ Search Tips

☐ Open results in a new window

 Try an [Advanced Search](#)

 Try this search in [The ACM Guide](#)

Results 61 - 80 of 200

 Result page: [previous](#) [1](#) [2](#) [3](#) [4](#) [5](#) [6](#) [7](#) [8](#) [9](#) [10](#) [next](#)

Best 200 shown

 Relevance scale ☐ ☐ ☐ ☐ ☐

### 61 [Level set and PDE methods for computer graphics](#)



David Breen, Ron Fedkiw, Ken Museth, Stanley Osher, Guillermo Sapiro, Ross Whitaker  
August 2004 **ACM SIGGRAPH 2004 Course Notes SIGGRAPH '04**

Publisher: ACM Press

 Full text available: pdf(17.07 MB) Additional Information: [full citation](#), [abstract](#), [citations](#)

Level set methods, an important class of partial differential equation (PDE) methods, define dynamic surfaces implicitly as the level set (iso-surface) of a sampled, evolving nD function. The course begins with preparatory material that introduces the concept of using partial differential equations to solve problems in computer graphics, geometric modeling and computer vision. This will include the structure and behavior of several different types of differential equations, e.g. the level set eq ...

### 62 [Point-based computer graphics](#)



Marc Alexa, Markus Gross, Mark Pauly, Hanspeter Pfister, Marc Stamminger, Matthias Zwicker  
August 2004 **ACM SIGGRAPH 2004 Course Notes SIGGRAPH '04**

Publisher: ACM Press

 Full text available: pdf(8.94 MB) Additional Information: [full citation](#), [abstract](#), [citations](#)

This course introduces points as a powerful and versatile graphics primitive. Speakers present their latest concepts for the acquisition, representation, modeling, processing, and rendering of point sampled geometry along with applications and research directions. We describe algorithms and discuss current problems and limitations, covering important aspects of point based graphics.

### 63 [Overview of augmented reality](#)



Ronald Azuma  
August 2004 **ACM SIGGRAPH 2004 Course Notes SIGGRAPH '04**

Publisher: ACM Press

 Full text available: pdf(6.12 MB) Additional Information: [full citation](#)

### 64 [The elements of nature: interactive and realistic techniques](#)



Oliver Deussen, David S. Ebert, Ron Fedkiw, F. Kenton Musgrave, Przemyslaw Prusinkiewicz, Doug Roble, Jos Stam, Jerry Tessendorf  
August 2004 **ACM SIGGRAPH 2004 Course Notes SIGGRAPH '04**

**Publisher:** ACM Press

Full text available:  [pdf\(17.65 MB\)](#) Additional Information: [full citation](#), [abstract](#)

This updated course on simulating natural phenomena will cover the latest research and production techniques for simulating most of the elements of nature. The presenters will provide movie production, interactive simulation, and research perspectives on the difficult task of photorealistic modeling, rendering, and animation of natural phenomena. The course offers a nice balance of the latest interactive graphics hardware-based simulation techniques and the latest physics-based simulation techni ...

## 65 Crowd and group animation



Daniel Thalmann, Christophe Hery, Seth Lippman, Hiromi Ono, Stephen Regelous, Douglas Sutton

August 2004 **ACM SIGGRAPH 2004 Course Notes SIGGRAPH '04**

**Publisher:** ACM Press

Full text available:  [pdf\(20.19 MB\)](#) Additional Information: [full citation](#), [abstract](#)

A continuous challenge for special effects in movies is the production of realistic virtual crowds, in terms of rendering and behavior. This course will present state-of-the-art techniques and methods. The course will explain in details the different approaches to create virtual crowds: particle systems with flocking techniques using attraction and repulsion forces, copy and pasting techniques, agent-based methods. The architecture of software tools will be presented including the MASSIVE softwa ...

## 66 Towards a Formal Approach to Overhearing: Algorithms for Conversation Identification

Gery Gutnik, Gal Kaminka

July 2004 **Proceedings of the Third International Joint Conference on Autonomous Agents and Multiagent Systems - Volume 1 AAMAS '04**

**Publisher:** IEEE Computer Society

Full text available:  [pdf\(243.49 KB\)](#) Additional Information: [full citation](#), [abstract](#), [citations](#), [index terms](#)

Overhearing is gaining attention as a generic method for cooperative monitoring of distributed, open, multiagent systems. It involves monitoring the routine conversations of agents  $\epsilon$  who know they are being overheard  $\epsilon$  to assist the agents, assess their progress, or suggest advice. While there have been several investigations of applications and methods of overhearing, no formal model of overhearing exists. This paper takes steps towards such a model. It first formalizes a conversation system  $\epsilon$  ...

## 67 Reusing Coordination and Negotiation Strategies in Multi-Agent Systems for Ubiquitous Network Environment



Toshiharu Sugawara, Satoshi Kurihara, Kensuke Fukuda, Toshio Hirotsu, Shigemi Aoyagi, Toshihiro Takada

July 2004 **Proceedings of the Third International Joint Conference on Autonomous Agents and Multiagent Systems - Volume 1 AAMAS '04**

**Publisher:** IEEE Computer Society

Full text available:  [pdf\(253.91 KB\)](#) Additional Information: [full citation](#), [abstract](#), [citations](#), [index terms](#)


Recently, we proposed an intelligent ubiquitous computing (ubicom) environment where sensors and/or their stations/servers have CPUs to cooperatively learn generalized series of sensed events that are involved in human activities. This can be regarded as a multi-agent application. Because ubicom applications target support for daily-life activities, one of their characteristics is that the same/similar series of events occurs frequently. Multi-agent plans in applications of this type are used ...


- 
A multi-national study of reading and tracing skills in novice programmers

- Raymond Lister, Elizabeth S. Adams, Sue Fitzgerald, William Fone, John Hamer, Morten Lindholm, Robert McCartney, Jan Erik Moström, Kate Sanders, Otto Seppälä, Beth Simon, Lynda Thomas
- June 2004 **ACM SIGCSE Bulletin , Working group reports from ITiCSE on Innovation and technology in computer science education ITiCSE-WGR '04**, Volume 36 Issue 4

**Publisher:** ACM Press

Full text available:  [pdf\(410.24 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [citations](#)

A study by a ITiCSE 2001 working group ("the McCracken Group") established that many students do not know how to program at the conclusion of their introductory courses. A popular explanation for this incapacity is that the students lack the ability to problem-solve. That is, they lack the ability to take a problem description, decompose it into sub-problems and implement them, then assemble the pieces into a complete solution. An alternative explanation is that many students have a fragile gras ...


- 69 Research sessions: Web, XML and IR: Using the structure of Web sites for automatic segmentation of tables



 Kristina Lerman, Lise Getoor, Steven Minton, Craig Knoblock  
 June 2004 **Proceedings of the 2004 ACM SIGMOD international conference on Management of data SIGMOD '04**

**Publisher:** ACM Press


Full text available:  [pdf\(335.49 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [citations](#)

Many Web sites, especially those that dynamically generate HTML pages to display the results of a user's query, present information in the form of list or tables. Current tools that allow applications to programmatically extract this information rely heavily on user input, often in the form of labeled extracted records. The sheer size and rate of growth of the Web make any solution that relies primarily on user input is infeasible in the long term. Fortunately, many Web sites contain much explicit ...

- 70 Supporting personalization: Supporting personal collections across digital libraries in spatial hypertext




 Frank M. Shipman, Haowei Hsieh, J. Michael Moore, Anna Zacchi  
 June 2004 **Proceedings of the 4th ACM/IEEE-CS joint conference on Digital libraries JCDL '04**


**Publisher:** ACM Press

Full text available:  [pdf\(2.38 MB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [citations](#), [index terms](#)

Creating, maintaining, or using a digital library requires the manipulation of digital documents. Information workspaces provide a visual representation allowing users to collect, organize, annotate, and author information. The Visual Knowledge Builder(VKB) helps users access, collect, annotate, and combine materials from digital libraries and other sources into a personal information workspace VKB has been enhanced to include direct search interfaces for NSDL and Google. Users create a visualization ...


**Keywords:** collection organization, incremental formalization, information triage, information visualization, metadata, spatial hypertext

- 71 Bioinformatics—an introduction for computer scientists



 Jacques Cohen  
 June 2004 **ACM Computing Surveys (CSUR)**, Volume 36 Issue 2

**Publisher:** ACM Press

Additional Information: [full citation](#), [abstract](#), [references](#), [citations](#), [index](#)

Full text available:  pdf(261.56 KB)[terms](#)

The article aims to introduce computer scientists to the new field of bioinformatics. This area has arisen from the needs of biologists to utilize and help interpret the vast amounts of data that are constantly being gathered in genomic research---and its more recent counterparts, proteomics and functional genomics. The ultimate goal of bioinformatics is to develop in silico models that will complement in vitro and in vivo biological experiments. The article provides a bird's eye view of the ...

**Keywords:** DNA, Molecular cell biology, RNA and protein structure, alignments, cell simulation and modeling, computer, dynamic programming, hidden-Markov-models, microarray, parsing biological sequences, phylogenetic trees

## 72 [Sharing educational resources: Semantic resource management for the web: an e-learning application](#)



Julien Tane, Christoph Schmitz, Gerd Stumme

May 2004 **Proceedings of the 13th international World Wide Web conference on Alternate track papers & posters WWW Alt. '04**

**Publisher:** ACM PressFull text available:  pdf(796.74 KB)

Additional Information: [full citation](#), [abstract](#), [references](#), [citings](#), [index terms](#)

Topics in education are changing with an ever faster pace. ELearning resources tend to be more and more decentralized. Users increasingly need to be able to use the resources of the web. For this, they should have tools for finding and organizing information in a decentralized way. In this paper, we show how an ontologybased tool suite allows to make the most of the resources available on the web.

**Keywords:** e-learning, knowledge management, semantic web

## 73 [Web site engineering: Enforcing strict model-view separation in template engines](#)



Terence John Parr

May 2004 **Proceedings of the 13th international conference on World Wide Web WWW '04**

**Publisher:** ACM PressFull text available:  pdf(118.03 KB)

Additional Information: [full citation](#), [abstract](#), [references](#), [citings](#), [index terms](#)

The mantra of every experienced web application developer is the same: *thou shalt separate business logic from display*. Ironically, almost all template engines allow violation of this separation principle, which is the very impetus for HTML template engine development. This situation is due mostly to a lack of formal definition of separation and fear that enforcing separation emasculates a template's power. I show that not only is strict separation a worthy design principle, but that we c ...


**Keywords:** model-view-controller, template engine, web application

## 74 [Integrating Metadata Tools with the Data Services Archive to Provide Web-based Management of Large-Scale Scientific Simulation Data](#)



Victor P. Holmes, Wilbur R. Johnson, David J. Miller

April 2004 **Proceedings of the 37th annual symposium on Simulation ANSS '04**

**Publisher:** IEEE Computer SocietyFull text available:  pdf(226.75 KB)

Additional Information: [full citation](#), [abstract](#), [index terms](#)

A Metadata tools system and a Data Services system are undergoing development and integration, at Sandia National Laboratories, to provide web-based access to high-performance computing clusters and its associated simulation data. These clusters host a set of scalable post-processing applications for very large data manipulation, and the examination of results generated by high-fidelity simulations in support of the design to analysis process for ensuring safety and reliability of the nation's nuclear ...

### 75 A Self Manageable Infrastructure for Supporting Web-based Simulations

Yingping Huang, Xiaorong Xiang, Gregory Madey

April 2004 **Proceedings of the 37th annual symposium on Simulation ANSS '04**

**Publisher:** IEEE Computer Society

Full text available:  [pdf\(574.08 KB\)](#) Additional Information: [full citation](#), [abstract](#), [index terms](#)

In this paper, we describe the design and implementation of a self-manageable multi-tiered infrastructure to support web-based scientific simulations. This infrastructure demonstrates not only the successful integration of Web servers, simulation servers, database servers, report servers, data warehousing and mining, but also the ability to achieve self manageability: self-configuring, self-healing, self-protecting and self-optimizing. A scientific simulation program, NOMSIM (Natural Organic Matter Simulation) ...

### 76 Bioinformatics (BIO): An architecture for biological information extraction and representation

Aditya Vailaya, Peter Bluvias, Robert Kincaid, Allan Kuchinsky, Michael Creech, Annette Adler

March 2004 **Proceedings of the 2004 ACM symposium on Applied computing SAC '04**

**Publisher:** ACM Press

Full text available:  [pdf\(355.71 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#)

Technological advances in biomedical research are generating a plethora of heterogeneous data at a high rate. There is a critical need for extraction, integration and management tools for information discovery and synthesis from these heterogeneous data. In this paper, we present a general architecture, called ALFA, for information extraction and representation from diverse biological data. The ALFA architecture consists of: (i) a networked, hierarchical object model for representing information ...

**Keywords:** bioinformatics, filtering, heterogeneous data, information representation, information retrieval, interactive text mining, software architecture, user-guided information extraction

### 77 Vector reduction/transformation operators

Roscoe A. Bartlett, Bart G. Van Bloemen Waanders, Michael A. Heroux

March 2004 **ACM Transactions on Mathematical Software (TOMS)**, Volume 30 Issue 1

**Publisher:** ACM Press

Full text available:  [pdf\(516.85 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Development of flexible linear algebra interfaces is an increasingly critical issue. Efficient and expressive interfaces are well established for some linear algebra abstractions, but not for vectors. Vectors differ from other abstractions in the diversity of necessary operations, sometimes requiring dozens for a given algorithm (e.g. interior-point methods for optimization). We discuss a new approach based on operator objects that are transported to the underlying data by the linear algebra lib ...

**Keywords:** Optimization, interfaces, object-orientation, vectors

### 78 Stateful distributed interposition



John Reumann, Kang G. Shin

February 2004 **ACM Transactions on Computer Systems (TOCS)**, Volume 22 Issue 1**Publisher:** ACM PressFull text available: [pdf\(833.84 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Interposition-based system enhancements for multitiered servers are difficult to build because important system context is typically lost at application and machine boundaries. For example, resource quotas and user identities do not propagate easily between cooperating services that execute on different hosts or that communicate with each other via intermediary services. Application-transparent system enhancement is difficult to achieve when such context information is obscured by complex service ...

**Keywords:** Distributed computing, component services, distributed context, multitiered services, operating systems, server consolidation

## 79 System-level design methodology: Object-oriented modeling and synthesis of SystemC specifications

C. Schulz-Key, M. Winterholer, T. Schweizer, T. Kuhn, W. Rosenstiel

January 2004 **Proceedings of the 2004 conference on Asia South Pacific design automation: electronic design and solution fair ASP-DAC '04 , Proceedings of the 2004 conference on Asia South Pacific design automation: electronic design and solution fair ASP-DAC '04**

**Publisher:** IEEE PressFull text available: [pdf\(109.85 KB\)](#)Additional Information: [full citation](#), [abstract](#), [references](#), [citations](#)[Publisher Site](#)

The constantly increasing complexity of today's systems demands specifications on highest levels of abstraction. In addition to a transition towards the system-level more elaborate techniques are necessary to close a growing productivity gap. Our solution to this problem is the application of the object-oriented programming paradigm together with the *de facto* industry standard *SystemC*. In this paper we show that this approach is feasible and present the integration of *SystemC* into ...

## 80 A molecular architecture for creating advanced GUIs



Eric Lecolinet

November 2003 **Proceedings of the 16th annual ACM symposium on User interface software and technology UIST '03**

**Publisher:** ACM PressFull text available: [pdf\(1.50 MB\)](#)Additional Information: [full citation](#), [abstract](#), [references](#), [citations](#), [index terms](#)

This paper presents a new GUI architecture for creating advanced interfaces. This model is based on a limited set of general principles that improve flexibility and provide capabilities for implementing information visualization techniques such as magic lenses, transparent tools or semantic zooming. This architecture also makes it possible to create multiple views and application-sharing systems (by sharing views on multiple computer screens) in a simple and uniform way and to handle bimanual in ...

**Keywords:** GUI architectures, GUI toolkits, Ubit, ZUIs, bi-manual interaction, brickgets, declarative languages, multiple displays, multiple-views, transparent tools

Useful downloads:  [Adobe Acrobat](#)  [QuickTime](#)  [Windows Media Player](#)  [Real Player](#)


[Subscribe \(Full Service\)](#) [Register \(Limited Service, Free\)](#) [Login](#)

 Search: ☒ The ACM Digital Library ☐ The Guide



THE ACM DIGITAL LIBRARY


[Feedback](#) [Report a problem](#) [Satisfaction survey](#)

 Terms used [html template page pointer table](#)

Found 71,243 of 198,617

Sort results by


[Save results to a Binder](#)
[Try an Advanced Search](#)

Display results


[Search Tips](#)
[Try this search in The ACM Guide](#)
☐ Open results in a new window

Results 1 - 20 of 200

 Result page: [1](#) [2](#) [3](#) [4](#) [5](#) [6](#) [7](#) [8](#) [9](#) [10](#) [next](#)

Best 200 shown

 Relevance scale ☐ ☐ ☐ ☐ ☐

# 1 [Detection and evidence: A fast and robust method for web page template detection](#)


[and removal](#)

Karane Vieira, Altigran S. da Silva, Nick Pinto, Edleno S. de Moura, João M. B. Cavalcanti, Juliana Freire

November 2006

**Proceedings of the 15th ACM international conference on Information and knowledge management CIKM '06**

Publisher: ACM Press

 Full text available: [pdf\(316.20 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

The widespread use of templates on the Web is considered harmful for two main reasons. Not only do they compromise the relevance judgment of many web IR and web mining methods such as clustering and classification, but they also negatively impact the performance and resource usage of tools that process web pages. In this paper we present a new method that efficiently and accurately removes templates found in collections of web pages. Our method works in two steps. First, the costly process of te ...

**Keywords:** web page noise removal, web template extraction

# 2 [Performance & architecture: Improving network efficiency in real-time groupware with](#)


[general message compression](#)

Carl Gutwin, Christopher Fedak, Mark Watson, Jeff Dyck, Tim Bell

November 2006

**Proceedings of the 2006 20th anniversary conference on Computer supported cooperative work CSCW '06**

Publisher: ACM Press

 Full text available: [pdf\(371.61 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Groupware communicates by sending messages across the network, and groupware programmers use a variety of formats for these messages, such as XML, plain text, or serialized objects. Although these formats have many advantages, they are often so verbose that they overload the system's network resources. Groupware programmers could improve efficiency by using more compact formats, but this efficiency comes at the cost of increased complexity, reduced convenience, and reduced readability. In this p ...

**Keywords:** groupware performance, message compression, network delay



### 3 Frontmatter (TOC, Miscellaneous material)



ACM SIGSOFT Software Engineering Notes staff  
November 2006 **ACM SIGSOFT Software Engineering Notes**, Volume 31 Issue 6

**Publisher:** ACM Press

Full text available: [pdf\(1.25 MB\)](#) Additional Information: [full citation](#)

### 4 Intrusion detection: Packet vaccine: black-box exploit detection and signature generation



XiaoFeng Wang, Zhuowei Li, Jun Xu, Michael K. Reiter, Chongkyung Kil, Jong Youl Choi  
October 2006 **Proceedings of the 13th ACM conference on Computer and communications security CCS '06**

**Publisher:** ACM Press

Full text available: [pdf\(451.38 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

In biology, a *vaccine* is a weakened strain of a virus or bacterium that is intentionally injected into the body for the purpose of stimulating antibody production. Inspired by this idea, we propose a packet vaccine mechanism that randomizes address-like strings in packet payloads to carry out fast exploit detection, vulnerability diagnosis and signature generation. An exploit with a randomized jump address behaves like a vaccine: it will likely cause an exception in a vulnerable program's p ...

**Keywords:** black-box defense, exploit detection, signature generation, vaccine injection, worm

### 5 Vision: Measuring website usability for visually impaired people-a modified GOMS analysis



Henrik Tonn-Eichstädt  
October 2006 **Proceedings of the 8th international ACM SIGACCESS conference on Computers and accessibility Assets '06**

**Publisher:** ACM Press

Full text available: [pdf\(853.56 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Web designers regularly wonder which version of a design would suit best their target groups' needs. This becomes even more complicated if the design is to comply with accessibility rules. This paper describes an interaction model of blind users' interaction strategies. This model is based on GOMS (Goals, Operators, Methods, Selection rules) and can be used to measure aspects of website usability for blind users. The model evolved from findings of user observations and field studies. It can be a ...

**Keywords:** GOMS, accessibility, blind users, braille, evaluation, screen reader, speech, usability, visually impaired users

### 6 Compilation: Stayin' alert:: moulding failure and exceptions to your needs



Anya Helene Bagge, Valentin David, Magne Haveraaen, Karl Trygve Kalleberg  
October 2006 **Proceedings of the 5th international conference on Generative programming and component engineering GPCE '06**

**Publisher:** ACM Press

Full text available: [pdf\(213.83 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Dealing with failure and exceptional situations is an important but tricky part of programming, especially when reusing existing components. Traditionally, it has been up to the designer of a library to decide whether to use a language's exception mechanism, return values, or other ways to indicate exceptional circumstances. The library user has

been bound by this choice, even though it may be inconvenient for a particular use. Furthermore, normal program code is often cluttered with code dealing ...

**Keywords:** abstraction, alert reporting and handling, aspects, domain-specific exception language, errors, failure, guarding, mouldable programming, partiality, separation of concerns

## 7 Dynamic languages symposium chair's welcome: PyPy's approach to virtual machine construction

Armin Rigo, Samuele Pedroni

October 2006 **Companion to the 21st ACM SIGPLAN conference on Object-oriented programming systems, languages, and applications OOPSLA '06**

**Publisher:** ACM Press

Full text available:  [pdf\(254.60 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

The PyPy project seeks to prove both on a research and a practical level the feasibility of constructing a virtual machine (VM) for a dynamic language in a dynamic language - in this case, Python. The aim is to translate (i.e. compile) the VM to arbitrary target environments, ranging in level from C/Posix to Smalltalk/Squeak via Java and CLI/.NET, while still being of reasonable efficiency within these environments. A key tool to achieve this goal is the systematic reuse of the Python language as ...

**Keywords:** Python, metacircularity, retargettable code generation, type inference, virtual machine

## 8 OOPSLA practitioner reports chair's welcome: OO techniques applied to a real-time, embedded, spaceborne application

Alexander T. Murray, Mohammad Shahabuddin

October 2006 **Companion to the 21st ACM SIGPLAN conference on Object-oriented programming systems, languages, and applications OOPSLA '06**

**Publisher:** ACM Press

Full text available:  [pdf\(510.33 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#)

Though Object-Oriented Analysis, Design, and languages have become the dominant practices in many, or most, domains of software engineering, concerns about complexity, size, and performance in the embedded, real-time software domain have led to a prevalent view that OO technology is not suitable for the domain. We challenge this view through a successful application of OOA, OOD, and C++ (including STL) in the embedded, real-time flight software in an Earth-orbiting science instrument named Aquar ...

**Keywords:** C++, embedded, object-oriented analysis, object-oriented design, real-time, unified modeling language, use case

## 9 Measurement and evaluation: Patches as better bug reports

Westley Weimer

October 2006 **Proceedings of the 5th international conference on Generative programming and component engineering GPCE '06**

**Publisher:** ACM Press

Full text available:  [pdf\(248.94 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Tools and analyses that find bugs in software are becoming increasingly prevalent. However, even after the potential false alarms raised by such tools are dealt with, many real reported errors may go unfixed. In such cases the programmers have judged the benefit of fixing the bug to be less than the time cost of understanding and fixing it. The

true utility of a bug-finding tool lies not in the number of bugs it finds but in the number of bugs it causes to be fixed. Analyses that find safety-polic ...

**Keywords:** bug, bug report, counterexample, error, explanation, localization, patch

10 Compilation: Debugging C++ template metaprograms



Zoltán Porkoláb, József Mihalicza, Ádám Sipos

October 2006 **Proceedings of the 5th international conference on Generative programming and component engineering GPCE '06**

**Publisher:** ACM Press

Full text available: pdf(163.43 KB) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Template metaprogramming is an emerging new direction in C++ programming for executing algorithms in compilation time. Despite all of its already proven benefits and numerous successful applications, it is yet to be accepted in industrial projects. One reason is the lack of professional software tools supporting the development of template metaprograms. A strong analogue exists between traditional runtime programs and compile-time metaprograms. This connection presents the possibility for creati ...

**Keywords:** C++, debugging, template metaprogramming

11 Browsing & scrolling: Enabling web browsers to augment web sites' filtering and sorting functionalities



David F. Huynh, Robert C. Miller, David R. Karger

October 2006 **Proceedings of the 19th annual ACM symposium on User interface software and technology UIST '06**

**Publisher:** ACM Press

Full text available: pdf(2.11 MB) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Existing augmentations of web pages are mostly small cosmetic changes (e.g., removing ads) and minor addition of third-party content (e.g., product prices from competing sites). None leverages the structured data presented in web pages. This paper describes Sifter, a web browser extension that can augment a well-structured web site with advanced filtering and sorting functionality. These added features work inside the site's own pages, preserving the site's presentational style and the user's co ...

**Keywords:** DOM, HTML, augment, dynamic query, faceted browsing, filter, sort, tree alignment, web

12 Enhancements and evolution: Yet another network simulator



Mathieu Lacage, Thomas R. Henderson

October 2006 **Proceeding from the 2006 workshop on ns-2: the IP network simulator WNS2 '06**

**Publisher:** ACM Press

Full text available: pdf(183.55 KB) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

We report on the design objectives and initial design of a new discrete-event network simulator for the research community. Creating Yet Another Network Simulator (*yans*, <http://yans.inria.fr/yans>) is not the sort of prospect network researchers are happy to contemplate, but this effort may be timely given that *ns-2* is considering a major revision and is evaluating new simulator cores. We describe why we did not choose to build on existing tools such as *ns-2*, *GTNetS*, and *OPNE* ...

13 Novel web applications: The portrait of a common HTML web page

-  Ryan Levering, Michal Cutler  
October 2006 **Proceedings of the 2006 ACM symposium on Document engineering  
DocEng '06**


**Publisher:** ACM Press

Full text available:  [pdf\(270.72 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Web pages are not purely text, nor are they solely HTML. This paper surveys HTML web pages; not only on textual content, but with an emphasis on higher order visual features and supplementary technology. Using a crawler with an in-house developed rendering engine, data on a pseudo-random sample of web pages is collected. First, several basic attributes are collected to verify the collection process and confirm certain assumptions on web page text. Next, we take a look at the distribution of diff ...

**Keywords:** CSS, HTML, feature, javascript, script, style, survey, visual, world wide web

14 Session III: A technique for generic iteration and its optimization

-  Stephen M. Watt  
September 2006 **Proceedings of the 2006 ACM SIGPLAN workshop on Generic  
programming WGP '06**

**Publisher:** ACM Press

Full text available:  [pdf\(184.87 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Software libraries rely increasingly on iterators to provide generic traversal of data structures. These iterators can be represented either as objects that maintain state or as programs that suspend and resume control. This paper addresses two problems that remain in the use of iterators today: The first problem is that iterators represented as state-saving objects in languages such as C++ or Java typically have logic that is much more complicated than control-based iterators. This paper presen ...

**Keywords:** generic program, ingiterators

15 Teachers & learners: which to study?: What do teachers teach in introductory  
programming?

-  Carsten Schulte, Jens Bennedsen  
September 2006 **Proceedings of the 2006 international workshop on Computing  
education research ICER '06**

**Publisher:** ACM Press

Full text available:  [pdf\(324.08 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

In this article, we try to create a general, worldwide picture of teachers' opinion about what should be taught in introductory programming courses. We focus on the debate about restructuring CS1. The study explores what teachers believe is important to teach, what they actually teach, and what students find most difficult (according to their teachers). what is the general approach to teaching (programming language, IDE, object-orientation or not, type of institution), what topics are taught, an ...

**Keywords:** CS1, OO programming, course design, object interaction, program comprehension

16 Research papers: Towards Wikis as semantic hypermedia

-  Robert Tolksdorf, Elena Paslaru Bontas Simperl  
August 2006 **Proceedings of the 2006 international symposium on Wikis WikiSym '06**

**Publisher:** ACM Press

Full text available:  [pdf\(239.02 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

Similarly to the Web Wikis have *advanced* from initially simple ad-hoc solutions to highly popular systems of widespread use. This evolution is reflected by the impressive number of Wiki engines available and by the numerous settings and disciplines they have found applicability to in the last decade. In conjunction to these rapid advances the question on the fundamental principles underlying the design and the architecture of Wiki technologies becomes inevitable for their *systematic*

**Keywords:** Wikis, hypermedia, semantic web, semantic wikis

17 Exploiting perception in high-fidelity virtual environments: Exploiting perception in high-fidelity virtual environments



**Additional presentations from the 24th course are available on the citation page**

Mashhuda Glencross, Alan G. Chalmers, Ming C. Lin, Miguel A. Otaduy, Diego Gutierrez  
July 2006 **ACM SIGGRAPH 2006 Courses SIGGRAPH '06**

**Publisher:** ACM Press

Full text available: pdf(5.07 MB) mov(68:6 MIN) Additional Information: [full citation](#), [abstract](#), [references](#)

The objective of this course is to provide an introduction to the issues that must be considered when building high-fidelity 3D engaging shared virtual environments. The principles of human perception guide important development of algorithms and techniques in collaboration, graphical, auditory, and haptic rendering. We aim to show how human perception is exploited to achieve realism in high fidelity environments within the constraints of available finite computational resources. In this course w ...

**Keywords:** collaborative environments, haptics, high-fidelity rendering, human-computer interaction, multi-user, networked applications, perception, virtual reality

18 Geometric modeling based on triangle meshes: Geometric modeling based on triangle meshes



Mario Botsch, Mark Pauly, Christian Rossl, Stephan Bischoff, Leif Kobbelt  
July 2006 **ACM SIGGRAPH 2006 Courses SIGGRAPH '06**

**Publisher:** ACM Press

Full text available: pdf(24.22 MB) Additional Information: [full citation](#), [references](#)

19 Surface modeling and parameterization with manifolds: Surface modeling and parameterization with manifolds: Siggraph 2006 course notes



**Author presentation videos are available from the citation page**

Cindy Grimm, Denis Zorin

July 2006 **ACM SIGGRAPH 2006 Courses SIGGRAPH '06**

**Publisher:** ACM Press

Full text available: pdf(17.85 MB) mov(251.00 bytes) Additional Information: [full citation](#), [abstract](#), [references](#)

Many diverse applications in different areas of computer graphics, including geometric modeling, rendering and animation, require dealing with sets which cannot be easily represented with a single function on a simple domain in a Euclidean space: Examples include surfaces of nontrivial topology, environment maps, reflection/transmission functions, light fields, configuration spaces of animation skeletons, and others. In most cases these objects are described as collections of functions defined o ...

**20** Inverted files for text search engines

Justin Zobel, Alistair Moffat

July 2006 **ACM Computing Surveys (CSUR)**, Volume 38 Issue 2**Publisher:** ACM PressFull text available: [pdf\(944.29 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

The technology underlying text search engines has advanced dramatically in the past decade. The development of a family of new index representations has led to a wide range of innovations in index storage, index construction, and query evaluation. While some of these developments have been consolidated in textbooks, many specific techniques are not widely known or the textbook descriptions are out of date. In this tutorial, we introduce the key techniques in the area, describing both a core impl ...

**Keywords:** Inverted file indexing, Web search engine, document database, information retrieval, text retrieval

Results 1 - 20 of 200

Result page: [1](#) [2](#) [3](#) [4](#) [5](#) [6](#) [7](#) [8](#) [9](#) [10](#) [next](#)

The ACM Portal is published by the Association for Computing Machinery. Copyright © 2007 ACM, Inc.

[Terms of Usage](#) [Privacy Policy](#) [Code of Ethics](#) [Contact Us](#)Useful downloads: [Adobe Acrobat](#) [QuickTime](#) [Windows Media Player](#) [Real Player](#)